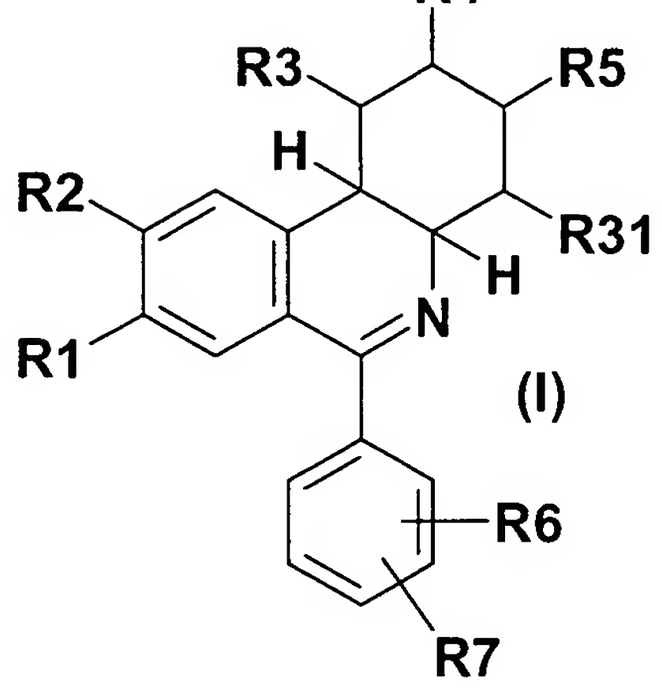
## Appendix A

## Claim Amendments

1. (Currently amended) ~~Compounds~~ A compound of formula I,




in which

R1 is hydroxyl, 1-4C-alkoxy, 3-7C-cycloalkoxy, 3-7C-cycloalkylmethoxy, 2,2-difluoroethoxy, or completely or predominantly fluorine-substituted 1-4C-alkoxy,

R2 is hydroxyl, 1-4C-alkoxy, 3-7C-cycloalkoxy, 3-7C-cycloalkylmethoxy, 2,2-difluoroethoxy, or completely or predominantly fluorine-substituted 1-4C-alkoxy,

or in which

R1 and R2 together are a 1-2C-alkylenedioxy group,

R3 is hydrogen or 1-4C-alkyl,

R31 is hydrogen or 1-4C-alkyl,

wherein either, in a first embodiment (embodiment a) ~~according to the present invention~~,

R4 is -O-R41, in which

R41 is hydrogen, 1-4C-alkyl, 1-4C-alkoxy-1-4C-alkyl, hydroxy-2-4C-alkyl, 1-7C-alkylcarbonyl, or completely or predominantly fluorine-substituted 1-4C-alkyl, and

R5 is hydrogen or 1-4C-alkyl,

or, in a second embodiment (embodiment b) ~~according to the present invention~~,

R4 is hydrogen or 1-4C-alkyl, and

R5 is -O-R51, in which

R51 is hydrogen, 1-4C-alkyl, 1-4C-alkoxy-1-4C-alkyl, hydroxy-2-4C-alkyl, 1-7C-alkylcarbonyl, or completely or predominantly fluorine-substituted 1-4C-alkyl,

R6 is hydrogen, halogen, 1-4C-alkyl or 1-4C-alkoxy,

wherein in a first aspect (aspect 1) ~~according to this invention~~,

R7 is $-S(O)_2N(R8)R9$, in which

R8 is hydrogen, 1-4C-alkyl, 1-4C-alkoxy-2-4C-alkyl or 3-7C-cycloalkyl,

R9 is hydrogen, 1-4C-alkyl or 1-4C-alkoxy-2-4C-alkyl,

or R8 and R9 together and with inclusion of the nitrogen atom, to which they are attached, form a heterocyclic ring Het1, in which

Het1 is optionally substituted by R81, and is a 3- to 7-membered saturated monocyclic heterocyclic ring radical comprising the nitrogen atom, to which R8 and R9 are bonded, and optionally one further heteroatom selected from the group consisting of oxygen, nitrogen and sulfur, in which

R81 is 1-4C-alkyl,

or, in a second aspect (aspect 2) ~~according to this invention~~,

R7 is $-A-N(R10)S(O)_2-R11$, in which

A is a bond or 1-4C-alkylene,

R10 is hydrogen or 1-4C-alkyl,

R11 is 1-4C-alkyl, or R111-substituted phenyl, in which

R111 is halogen or 1-4C-alkyl,

or, in a third aspect (aspect 3) ~~according to this invention~~,

R7 is $-S(O)_nR12$, in which

n is 0, 1 or 2,

R12 is 1-4C-alkyl,

or an enantiomer, salt, N-oxide, salt of an N-oxide or enantiomer of an N-oxide thereof

~~and the salts, the N-oxides and the salts of the N-oxides of these compounds~~.

**2.** (Currently amended) ~~Compounds~~ A compound of formula I according to claim 1 in which

R1 is 1-2C-alkoxy, 3-5C-cycloalkoxy, 3-5C-cycloalkylmethoxy, 2,2-difluoroethoxy, or completely or predominantly fluorine-substituted 1-2C-alkoxy,

R2 is 1-2C-alkoxy, 3-5C-cycloalkoxy, 3-5C-cycloalkylmethoxy, 2,2-difluoroethoxy, or completely or predominantly fluorine-substituted 1-2C-alkoxy,

R3 is hydrogen,

R31 is hydrogen,

wherein either, in a first embodiment (embodiment a) ~~according to the present invention~~,

R4 is -O-R41, in which

R41 is hydrogen or 1-7C-alkylcarbonyl,

R5 is hydrogen,

or, in a second embodiment (embodiment b) ~~according to the present invention~~,

R4 is hydrogen, and

R5 is -O-R51, in which

R51 is hydrogen or 1-7C-alkylcarbonyl,

R6 is hydrogen or 1-4C-alkyl,

wherein in a first aspect (aspect 1) ~~according to this invention~~,

R7 is $-S(O)_2N(R8)R9$, in which

R8 is hydrogen, 1-4C-alkyl, 1-4C-alkoxy-2-4C-alkyl or 3-7C-cycloalkyl,

R9 is hydrogen, 1-4C-alkyl or 1-4C-alkoxy-2-4C-alkyl,

or R8 and R9 together and with inclusion of the nitrogen atom, to which they are attached, form a heterocyclic ring Het1, in which

Het1 is a 3- to 7-membered saturated monocyclic heterocyclic ring radical comprising the nitrogen atom, to which R8 and R9 are bonded, and optionally one further heteroatom selected from the group consisting of oxygen, nitrogen, N(R81) and sulfur, in which

R81 is 1-4C-alkyl,

or, in a second aspect (aspect 2) ~~according to this invention~~,

R7 is -A-N(R10)$S(O)_2$-R11, in which

A is a bond or 1-4C-alkylene,

R10 is hydrogen or 1-4C-alkyl,

R11 is 1-4C-alkyl, or R111-substituted phenyl, in which

R111 is halogen or 1-4C-alkyl,

or, in a third aspect (aspect 3) ~~according to this invention~~,

R7 is $-S(O)_nR12$, in which

n is 0, 1 or 2,

R12 is 1-4C-alkyl,

or an enantiomer, salt, N-oxide, salt of an N-oxide or enantiomer of an N-oxide thereof

~~and the salts, the N-oxides and the salts of the N-oxides of these compounds~~.

**3.** (Currently amended) ~~Compounds~~ A compound of formula I according to claim 1 in which

R1 is 1-2C-alkoxy, 2,2-difluoroethoxy, or completely or predominantly fluorine-substituted 1-2C-alkoxy,

R2 is 1-2C-alkoxy, 2,2-difluoroethoxy, or completely or predominantly fluorine-substituted 1-2C-alkoxy,

R3 is hydrogen,

R31 is hydrogen,

R4 is -O-R41, in which

R41 is 1-4C-alkylcarbonyl or hydrogen,

R5 is hydrogen,

R6 is hydrogen or methyl,

wherein in a first aspect (aspect 1) ~~according to this invention~~,

R7 is $-S(O)_2N(R8)R9$, in which

R8 is 1-4C-alkyl, 1-4C-alkoxy-2-4C-alkyl or 3-7C-cycloalkyl,

R9 is hydrogen, 1-4C-alkyl or 1-4C-alkoxy-2-4C-alkyl,

or R8 and R9 together, and with inclusion of the nitrogen atom, to which they are attached, form a heterocyclic ring Het1, in which

Het1 is morpholinyl, thiomorpholinyl, pyrrolidinyl, piperidinyl, 4-N-(R81)-piperazinyl, or 4-N-(R81)-homopiperazinyl, in which

R81 is 1-4C-alkyl,

or, in a second aspect (aspect 2) ~~according to this invention~~,

R7 is $-A-N(R10)S(O)_2-R11$, in which

A is a bond or 1-4C-alkylene,

R10 is hydrogen or 1-4C-alkyl,

R11 is 1-4C-alkyl, or R111-substituted phenyl, in which

R111 is halogen or 1-4C-alkyl,

or, in a third aspect (aspect 3) ~~according to this invention~~,

R7 is $-S(O)_nR12$, in which

n is 0, 1 or 2,

R12 is 1-4C-alkyl,

or an enantiomer, salt, N-oxide, salt of an N-oxide or enantiomer of an N-oxide thereof

~~and the salts, the N-oxides and the salts of the N-oxides of these compounds~~.

**4.** (Currently amended) ~~Compounds~~ A compound of formula I according to claim 1 in which

R1 is 1-2C-alkoxy, 2,2-difluoroethoxy, or completely or predominantly fluorine-substituted 1-2C-alkoxy,

R2 is 1-2C-alkoxy, 2,2-difluoroethoxy, or completely or predominantly fluorine-substituted 1-2C-alkoxy,

R3 is hydrogen,

R31 is hydrogen,

R4 is -O-R41, in which

R41 is acetyl or hydrogen,

R5 is hydrogen,

R6 is hydrogen or methyl,

wherein in a first aspect (aspect 1) ~~according to this invention~~,

R7 is $-S(O)_2N(R8)R9$, in which

R8 is 1-4C-alkyl, 1-4C-alkoxy-ethyl or 3-5C-cycloalkyl,

R9 is hydrogen, 1-4C-alkyl or 1-4C-alkoxy-ethyl,

or R8 and R9 together and with inclusion of the nitrogen atom, to which they are attached, form a heterocyclic ring Het1, in which

Het1 is morpholinyl, pyrrolidinyl, piperidinyl or 4-N-(R81)-piperazinyl, in which

R81 is 1-4C-alkyl,

or, in a second aspect (aspect 2) ~~according to this invention~~,

R7 is -A-N(R10)S(O)$_2$-R11, in which

A is a bond or 1-2C-alkylene,

R10 is hydrogen or 1-4C-alkyl,

R11 is 1-4C-alkyl, or R111-substituted phenyl, in which

R111 is fluorine, chlorine or 1-4C-alkyl,

or, in a third aspect (aspect 3) ~~according to this invention~~,

R7 is -S(O)$_n$R12, in which

n is 0, 1 or 2,

R12 is 1-4C-alkyl,

or an enantiomer, salt, N-oxide, salt of an N-oxide or enantiomer of an N-oxide thereof

~~and the salts, the N-oxides and the salts of the N-oxides of these compounds~~.

**5.** (Currently amended) ~~Compounds~~ A compound of formula I according to claim 1 in which

R1 is methoxy or ethoxy,

R2 is methoxy, ethoxy, 2,2-difluoroethoxy, or difluoromethoxy,

R3 is hydrogen,

R31 is hydrogen,

R4 is -O-R41, in which

R41 is hydrogen,

R5 is hydrogen,

R6 is hydrogen,

wherein in a first aspect (aspect 1) ~~according to this invention~~,

R7 is $-S(O)_2N(R8)R9$, in which

R8 is methyl, ethyl, propyl, 2-methoxy-ethyl or cyclopropyl,

R9 is hydrogen, methyl, ethyl, propyl or 2-methoxy-ethyl,

or R8 and R9 together and with inclusion of the nitrogen atom, to which they are attached, form a heterocyclic ring Het1, in which

Het1 is morpholinyl, pyrrolidinyl, piperidinyl or 4-N-(R81)-piperazinyl, in which

R81 is methyl,

or, in a second aspect (aspect 2) ~~according to this invention~~,

R7 is $-A-N(R10)S(O)_2-R11$, in which

A is a bond or methylene,

R10 is hydrogen or methyl,

R11 is R111-substituted phenyl, in which

R111 is fluorine, chlorine or methyl,

or, in a third aspect (aspect 3) ~~according to this invention~~,

R7 is $-S(O)_nR12$, in which

n is 0, 1 or 2,

R12 is 1-4C-alkyl, ~~such as e.g. methyl,~~

or an enantiomer, salt, N-oxide, salt of an N-oxide or enantiomer of an N-oxide thereof

~~and the salts, the N-oxides and the salts of the N-oxides of these compounds~~.

**6.** (Currently amended) ~~Compounds~~ A compound of formula I according to claim 1 in which

R1 is methoxy or ethoxy,

R2 is methoxy, ethoxy, 2,2-difluoroethoxy, or difluoromethoxy,

R3 is hydrogen,

R31 is hydrogen,

R4 is -O-R41, in which

R41 is hydrogen,

R5 is hydrogen,

R6 is hydrogen,

R7 is $-S(O)_nR12$, in which

n is 0 or 1,

R12 is methyl,

or an enantiomer, salt, N-oxide, salt of an N-oxide or enantiomer of an N-oxide thereof

~~and the salts, the N-oxides and the salts of the N-oxides of these compounds~~.

**7.** (Currently amended) ~~Compounds~~ A compound of formula I according to claim 1 ~~any of the preceding claims~~ comprising one or more of the following:

R1 is methoxy,

R2 is ethoxy, difluoromethoxy or 2,2-difluoroethoxy, and

R3 and R31 are both hydrogen, **[[;]]**

R4 is -O-R41, in which

R41 is hydrogen, and

R5 is hydrogen, **[[;]]**

R6 is hydrogen **[[;]]** and

R7 is bonded to the meta- or para position with respect to the binding position **[[**, in**]]** at which the phenyl ring is bonded ~~to the phenanthridine ring system;~~

or an enantiomer, salt, N-oxide, salt of an N-oxide or enantiomer of an N-oxide thereof

~~and the salts, the N-oxides and the salts of the N-oxides of these compounds~~.

**8.** (Currently amended) ~~Compounds~~ A compound of formula I according to claim 1 selected from the group consisting of

N-[4-((2RS,4aRS,10bRS)-2-Hydroxy-8,9-dimethoxy-1,2,3,4,4a,10b-hexahydro-phenanthridin-6-yl)-phenyl]-4,N-dimethyl-benzenesulfonamide,

4-Fluoro-N-[4-((2RS,4aRS,10bRS)-2-hydroxy-8,9-dimethoxy-1,2,3,4,4a,10b-hexahydro-phenanthridin-6-yl)-phenyl]-benzenesulfonamide,

N-[4-((2RS,4aRS,10bRS)-2-Hydroxy-8,9-dimethoxy-1,2,3,4,4a,10b-hexahydro-phenanthridin-6-yl)-2-methyl-phenyl]-4-methyl-benzenesulfonamide,

N-[4-((2RS,4aRS,10bRS)-2-Hydroxy-8,9-dimethoxy-1,2,3,4,4a,10b-hexahydro-phenanthridin-6-yl)-benzyl]-4-methyl-benzenesulfonamide,

N-{4-[(2RS,4aRS,10bRS)-8-(1,1-Difluoro-methoxy)-2-hydroxy-9-methoxy-1,2,3,4,4a,10b-hexahydro-phenanthridin-6-yl]-phenyl}-methanesulfonamide,

N-{4-[(2RS,4aRS,10bRS)-8-(1,1-Difluoro-methoxy)-2-hydroxy-9-methoxy-1,2,3,4,4a,10b-hexahydro-phenanthridin-6-yl]-phenyl}-4-methyl-benzenesulfonamide,

N-{4-[(2RS,4aRS,10bRS)-8-(1,1-Difluoro-methoxy)-2-hydroxy-9-methoxy-1,2,3,4,4a,10b-hexahydro-phenanthridin-6-yl]-phenyl}-4-fluoro-benzenesulfonamide,

N-{4-[(2RS,4aRS,10bRS)-8-(1,1-Difluoro-methoxy)-2-hydroxy-9-methoxy-1,2,3,4,4a,10b-hexahydro-phenanthridin-6-yl]-benzyl}-4-methyl-benzenesulfonamide,

N-{4-[(2RS,4aRS,10bRS)-9-(1,1-Difluoro-methoxy)-2-hydroxy-8-methoxy-1,2,3,4,4a,10b-hexahydro-phenanthridin-6-yl]-phenyl}-4-methyl-benzenesulfonamide,

N-{4-[(2RS,4aRS,10bRS)-9-(1,1-Difluoro-methoxy)-2-hydroxy-8-methoxy-1,2,3,4,4a,10b-hexahydro-phenanthridin-6-yl]-benzyl}-4-methyl-benzenesulfonamide,

N-[4-((2RS,4aRS,10bRS)-2-Hydroxy-8,9-dimethoxy-1,2,3,4,4a,10b-hexahydro-phenanthridin-6-yl)-phenyl]-4-methyl-benzenesulfonamide,

4-((2RS,4aRS,10bRS)-2-Hydroxy-8,9-dimethoxy-1,2,3,4,4a,10b-hexahydro-phenanthridin-6-yl)-N,N-dipropyl-benzenesulfonamide,

4-((2RS,4aRS,10bRS)-9-Ethoxy-2-hydroxy-8-methoxy-1,2,3,4,4a,10b-hexahydro-phenanthridin-6-yl)-N,N-dipropyl-benzenesulfonamide,

4-((2RS,4aRS,10bRS)-9-Ethoxy-2-hydroxy-8-methoxy-1,2,3,4,4a,10b-hexahydro-phenanthridin-6-yl)-N-(2-methoxy-ethyl)-N-methyl-benzenesulfonamide,

(2RS,4aRS,10bRS)-8-(1,1-Difluoro-methoxy)-9-methoxy-6-[4-(pyrrolidine-1-sulfonyl)-phenyl]-1,2,3,4,4a,10b-hexahydro-phenanthridin-2-ol,

(2RS,4aRS,10bRS)-8-(1,1-Difluoro-methoxy)-9-methoxy-6-[4-(piperidine-1-sulfonyl)-phenyl]-1,2,3,4,4a,10b-hexahydro-phenanthridin-2-ol,

(2RS,4aRS,10bRS)-8-(1,1-Difluoro-methoxy)-9-methoxy-6-[3-(pyrrolidine-1-sulfonyl)-phenyl]-1,2,3,4,4a,10b-hexahydro-phenanthridin-2-ol,

4-[(2RS,4aRS,10bRS)-8-(1,1-Difluoro-methoxy)-2-hydroxy-9-methoxy-1,2,3,4,4a,10b-hexahydro-phenanthridin-6-yl]-N,N-dipropyl-benzenesulfonamide,

(2RS,4aRS,10bRS)-8-(1,1-Difluoro-methoxy)-9-methoxy-6-[4-(morpholine-4-sulfonyl)-phenyl]-1,2,3,4,4a,10b-hexahydro-phenanthridin-2-ol,

(2RS,4aRS,10bRS)-8-(1,1-Difluoro-methoxy)-9-methoxy-6-[3-(morpholine-4-sulfonyl)-phenyl]-1,2,3,4,4a,10b-hexahydro-phenanthridin-2-ol,

(2RS,4aRS,10bRS)-8-(1,1-Difluoro-methoxy)-9-methoxy-6-[3-(piperidine-1-sulfonyl)-phenyl]-1,2,3,4,4a,10b-hexahydro-phenanthridin-2-ol,

3-[(2RS,4aRS,10bRS)-8-(1,1-Difluoro-methoxy)-2-hydroxy-9-methoxy-1,2,3,4,4a,10b-hexahydro-phenanthridin-6-yl]-N,N-dimethyl-benzenesulfonamide,

N-Cyclopropyl-3-[(2RS,4aRS,10bRS)-8-(1,1-difluoro-methoxy)-2-hydroxy-9-methoxy-1,2,3,4,4a,10b-hexahydro-phenanthridin-6-yl]-benzenesulfonamide,

3-[(2RS,4aRS,10bRS)-8-(1,1-Difluoro-methoxy)-2-hydroxy-9-methoxy-1,2,3,4,4a,10b-hexahydro-phenanthridin-6-yl]-N,N-bis-(2-methoxy-ethyl)-benzenesulfonamide,

(2RS,4aRS,10bRS)-8-(1,1-Difluoro-methoxy)-9-methoxy-6-[3-(4-methyl-piperazine-1-sulfonyl)-phenyl]-1,2,3,4,4a,10b-hexahydro-phenanthridin-2-ol,

(2RS,4aRS,10bRS)-9-(2,2-Difluoro-ethoxy)-8-methoxy-6-[3-(4-methyl-piperazine-1-sulfonyl)-phenyl]-1,2,3,4,4a,10b-hexahydro-phenanthridin-2-ol,

(2RS,4aRS,10bRS)-9-(2,2-Difluoro-ethoxy)-8-methoxy-6-[4-(pyrrolidine-1-sulfonyl)-phenyl]-1,2,3,4,4a,10b-hexahydro-phenanthridin-2-ol,

(2RS,4aRS,10bRS)-6-(3-Methanesulfonyl-phenyl)-8,9-dimethoxy-1,2,3,4,4a,10b-hexahydro-phenanthridin-2-ol,

(2RS,4aRS,10bRS)-9-Ethoxy-8-methoxy-6-(4-methylsulfanyl-phenyl)-1,2,3,4,4a,10b-hexahydro-phenanthridin-2-ol,

(2R,4aR,10bR)-9-Ethoxy-8-methoxy-6-(4-methylsulfanyl-phenyl)-1,2,3,4,4a,10b-hexahydro-phenanthridin-2-ol,

(2RS,4aRS,10bRS)-9-(2,2-Difluoro-ethoxy)-8-methoxy-6-(4-methylsulfanyl-phenyl)-1,2,3,4,4a,10b-hexahydro-phenanthridin-2-ol,

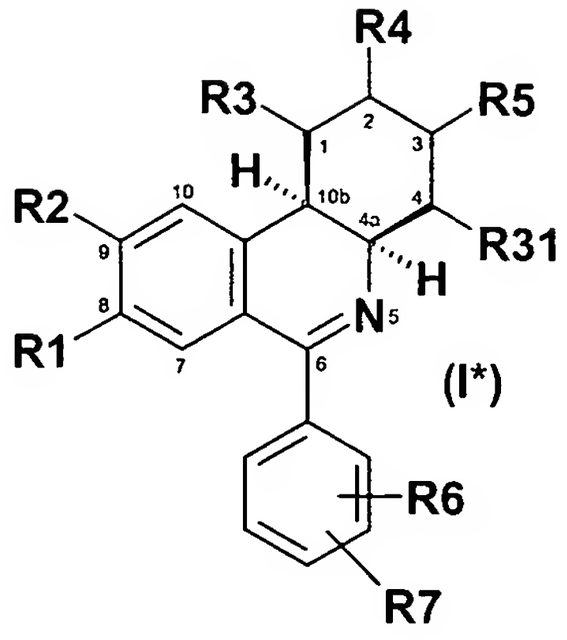
(2RS,4aRS,10bRS)-9-(2,2-Difluoro-ethoxy)-8-methoxy-6-(3-methylsulfanyl-phenyl)-1,2,3,4,4a,10b-hexahydro-phenanthridin-2-ol,

(2RS,4aRS,10bRS)-9-(2,2-Difluoro-ethoxy)-8-methoxy-6-(3-methylsulfinyl-phenyl)-1,2,3,4,4a,10b-hexahydro-phenanthridin-2-ol, **[[and]]**

(2R,4aR,10bR)-9-Ethoxy-8-methoxy-6-(4-methylsulfinyl-phenyl)-1,2,3,4,4a,10b-hexahydro-phenanthridin-2-ol,

and the enantiomers, ~~as well as the~~ salts, **[[the]]** N-oxides, ~~and the~~ salts of the N-oxides ~~of these compounds~~ and enantiomers of the N-oxides thereof.

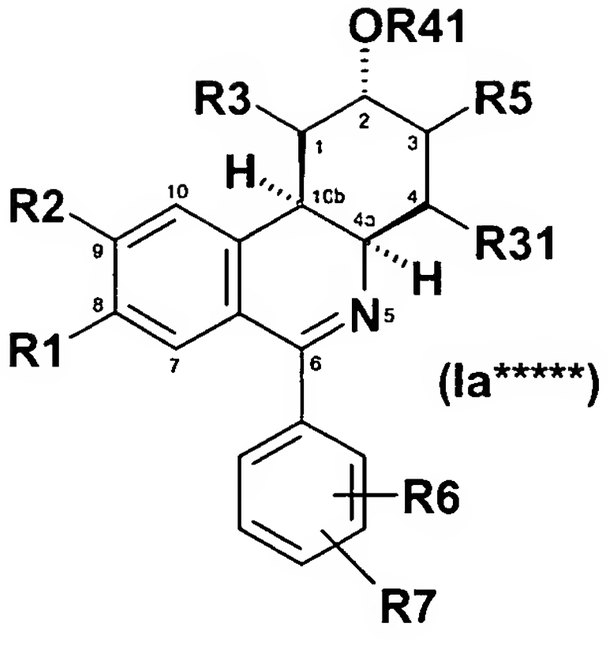
**9.** (Currently amended) ~~Compounds~~ A compound of formula I according to claim 1 ~~any of the preceding claims~~, which has **[[have]]** with respect to the positions 4a and 10b the configuration shown in formula I*:



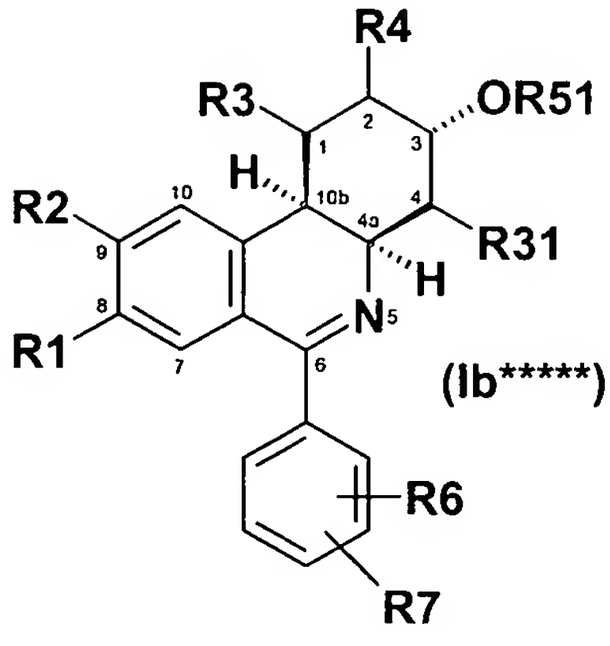

or a salt, N-oxide or salt of an N-oxide thereof

~~and the salts, the N-oxides and the salts of the N-oxides of these compounds~~.

**10.** (Currently amended) ~~Compounds~~ A compound of formula I according to claim 1 ~~any of the preceding claims~~, which has **[[**have**]]** with respect to the positions 2, 4a and 10b the configuration shown in formula Ia*****, or, which has **[[**have**]]** with respect to the positions 3, 4a and 10b the configuration shown in formula Ib*****:




(Ia*****)




(Ib*****)

or a salt, N-oxide or salt of an N-oxide thereof

~~and the salts, the N-oxides and the salts of the N-oxides of these compounds~~.

**11.** (Canceled)

**12.** (Currently amended) A pharmaceutical composition comprising one or more compounds of formula I as claimed in claim 1, or a pharmaceutically acceptable enantiomer, salt, N-oxide, salt of an N-oxide or enantiomer of an N-oxide thereof, together with a pharmaceutically acceptable excipient and/or vehicle ~~customary pharmaceutical excipients and/or vehicles~~.

**13.** - **14.** (Canceled)

**15.** (Currently amended) A method for treating an illness ~~illnesses~~ in a patient comprising administering to said patient a therapeutically effective amount of a compound of formula I as claimed in claim 1, or a pharmaceutically acceptable enantiomer, salt, N-oxide, salt of an N-oxide or enantiomer of an N-oxide thereof.

**16.** (Currently amended) A method for treating an airway disorder ~~disorders~~ in a patient comprising administering to said patient a therapeutically effective amount of a compound of formula I as claimed in claim 1, or a pharmaceutically acceptable enantiomer, salt, N-oxide, salt of an N-oxide or enantiomer of an N-oxide thereof.

**17.** (New) A method for treating a PDE-mediated disorder in a patient comprising administering to said patient a therapeutically effective amount of a compound of formula I as claimed in claim 1, or a pharmaceutically acceptable enantiomer, salt, N-oxide, salt of an N-oxide or enantiomer of an N-oxide thereof.